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NATIONAL COMMUNICABLE DISEASE CENTER

Morbidity and Mortality

Vol. 18, No. 29

WEEKLY REPORT

For Week Ending July 19, 1969

U.S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE / PUBLIC HEALTH SERVICE / HEALTH SERVICES AND MENTAL HEALTH ADMINISTRATION

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INTERNATIONAL NOTES

DENGUE FOLLOW-UP – Puerto Rico

During the week ending July 18, 1969, an additional 1,595 cases of dengue were reported in the outbreak in Puerto Rico. Cases have now been reported from 68 of the 77 administrative regions of the island. The first of two rounds of aerial spraying with an ultralow volume thiophosphate insecticide was conducted in two areas with a high incidence of cases; ground spraying is underway in other areas. Figure 1 shows the distribution of cases through July 11.

A localized outbreak of 38 cases of dengue occurred among 3,800 (attack rate 1 case per 100 persons per week) Puerto Rican National Guardsmen at an encampment area during the week of July 13, the first week of summer training. Since the encampment area was clean, sprayed daily, and had no evidence of breeding sites or an adult population of *Aedes aegypti* mosquitoes, the men must have acquired their infections prior to their arrival.

Paired sera were collected from persons in several areas of Puerto Rico and serologically tested at the pub-

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TABLE I. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES
(Cumulative totals include revised and delayed reports through previous weeks)

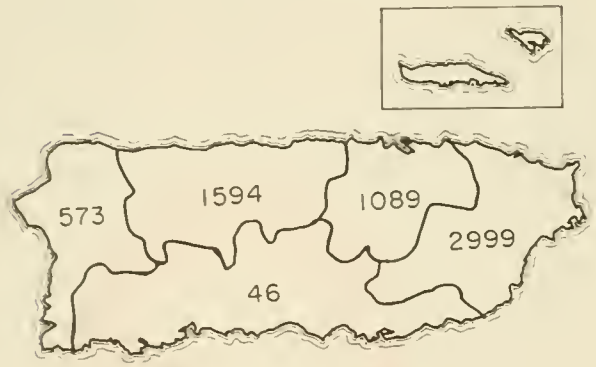
DISEASE	29th WEEK ENDED		MEDIAN	CUMULATIVE, FIRST 29 WEEKS		
	July 19, 1969	July 20, 1968	1964 - 1968	1969	1968	MEDIAN 1964 - 1968
Aseptic meningitis	72	120	62	1,018	1,140	924
Brucellosis	6	6	5	97	113	133
Diphtheria	1	6	3	81	99	90
Encephalitis, primary:						
Arthropod-borne & unspecified	23	26	35	555	507	757
Encephalitis, post-infectious	4	12	16	184	310	503
Hepatitis, serum	102	96	617	2,870	2,304	22,744
Hepatitis, infectious	830	786		25,860	24,175	
Malaria	74	37	16	1,484	1,198	181
Measles (rubeola)	328	273	1,418	19,056	18,310	184,028
Meningococcal infections, total	32	40	40	2,135	1,767	1,767
Civilian	28	36	- - -	1,936	1,597	- - -
Military	4	4	- - -	199	170	- - -
Mumps	889	968	- - -	63,783	119,344	- - -
Poliomyelitis, total	—	2	2	4	35	35
Paralytic	—	2	2	4	35	35
Rubella (German measles)	547	348	- - -	46,529	41,357	- - -
Streptococcal sore throat & scarlet fever	4,073	4,360	4,353	272,667	270,124	270,124
Tetanus	4	4	5	73	79	112
Tularemia	1	5	5	80	118	118
Typhoid fever	3	11	11	149	166	208
Typhus, tick-borne (Rky. Mt. spotted fever)	21	18	18	221	120	120
Rabies in animals	69	49	75	2,067	2,095	2,558

TABLE II. NOTIFIABLE DISEASES OF LOW FREQUENCY

	Cum.		Cum.
Anthrax:	2	Rabies in man:	1
Botulism:	10	Rubella congenital syndrome:	5
Leptospirosis: Tex.-1	35	Trichinosis:	148
Plague:	2	Typhus, murine: Ohio-1, Tex.-1	17
Psittacosis: Pa.-1	22		

DENGUE – *(Continued from front page)*

Figure 1
DISTRIBUTION BY HEALTH DISTRICT OF 6,301 CASES OF DENGUE REPORTED AS OF JULY 11, 1969 PUERTO RICO



lic health laboratory and at NCDC. A high percentage of the serum pairs demonstrated a rise in hemagglutination-inhibition (HI) and complement fixation (CF) titers with several group B arboviruses and many of the remaining pairs had very high HI and CF titers in each of both paired sera (Table 1). Sera collected early in the illness of one person without previous group B arbovirus infection had a primary CF rise with dengue II (Table 2).

Several viruses have been isolated from acute serum inoculated into newborn mice and LLCMK$_2$ and *Aedes albopictus* cell cultures. Preliminary identification of two strains indicates that they are more closely related to dengue II.

(Reported by Dr. Ernesto Colon-Yordan, Secretary of Health for Preventive Medicine, Dr. Raphael Correa-Coronas, Auxiliary Secretary of Health for Preventive Medicine, Dr. Luis Mainardi, Chief, Communicable Disease Control Program, and Dr. Angel Alberto Colon, Director, Institute of Laboratories of Health, Puerto Rico Department of Health; Col. Hector Sanpayo, Medical Officer, National Guard Camp; and a team from NCDC.)

Table 1
Laboratory Data on Paired Sera by Location

Location	Number of Serum Pairs	Number With Group B Titer Rise by HI or CF
Manati	19	13
Cataña, Tan Alta	37	24
Guaynabo	7	5
Total	63	42

Table 2
Laboratory Data on Sera Collected Early in Disease from One Case

Serum Specimen	Dengue Type I HI	I CF	II HI	II CF	III HI	III CF	IV HI	IV CF	Yellow Fever HI	Yellow Fever CF
I	20	<8	40	<8	10	<8	10	<8	<10	<8
II	80	<8	320	128	40	<8	20	<8	80	<8

EPIDEMIOLOGIC NOTES AND REPORTS
FATAL CASE OF IMPORTED MALARIA – Michigan

About May 13, 1969, a 41-year-old horticultural consultant developed fever and chills while visiting relatives in Southfield, Michigan. Because of the man's religious convictions, he did not seek medical attention. The patient died on May 20, and an autopsy was performed at the request of the medical examiner. The heart blood and red cells within the capillaries of all the tissues examined contained numerous ring-forms of *Plasmodium falciparum*. No gametocytes could be identified.

For the past 6 years the patient, his wife, and two children had lived in Johannesburg, South Africa. While there, he had made several business trips to Angola. On April 27, 1969, the entire family flew to Angola and spent 6 days there before arriving in Michigan on May 11 via Lisbon and Boston. The wife stated that her husband had been in excellent health prior to his terminal illness. No member of the family had ever taken malaria chemoprophylaxis. The other three family members have remained asymptomatic despite their refusal to accept chloroquine therapy.

(Reported by Bernard D. Berman, M.D., Director, Oakland County Department of Health; and George H. Agate, M.D., Chief, Division of Epidemiology, Michigan Department of Public Health.)

Editoriol Comment:

The usual 10 to 16-day intrinsic incubation period of falciparum malaria would place the exposure between April 26 and May 2, 1969. From April 27 through May 3, 1969, the patient and his family had been in Angola, a country where falciparum malaria infection is endemic.

HOSPITAL OUTBREAKS OF GASTROENTERITIS DUE TO *SALMONELLA INFANTIS*
United Stotes

Since April 1, 1969, five separate outbreaks of gastroenteritis due to *Salmonella infantis* have occurred in hospitals in Connecticut, New Jersey, Louisiana (MMWR, Vol. 18, No. 24), Tennessee, and, most recently, Massachusetts. Epidemic characteristics of the first four outbreaks (the fifth is currently being studied) were those of a common source exposure with subsequent secondary spread. However, to date, no common source has been documented in any of the outbreaks.

The occurrence of five separate hospital outbreaks due to *S. infantis* during a 3-month period is distinctly unusual. Although *S. infantis* is a rather common serotype, no frequent association with hospital outbreaks has previously been documented. For example, during the 6-year period, 1963-1968, *S. infantis* was involved in only one of 43 hospital outbreaks of salmonellosis recorded in surveillance reports of the Salmonellosis Unit, NCDC.

Some overall increase in the incidence of *S. infantis* isolations from humans was also noted during the first 5 months of this year – an increase not accounted for solely by the above five outbreaks. During this period, 452 isolations (6.1 percent of the total) were made versus only 332 (5.0 percent of the total), in 1968.

Therefore, it would appear quite possible that a common contaminated source may have been responsible for some if not all of these hospital outbreaks and for the overall increase of *S. infantis* isolations. Laboratory studies are in progress to characterize organisms from each of these episodes to evaluate the possibility of a single common source.

(Reported by James C. Hart, M.D., Director, Division of Preventable Diseases, Connecticut State Department of Health; Charles T. Caraway, D.V.M., Chief, Section of Epidemialagy, Louisiana State Department af Health; Nicholas J. Fiumara, M.D., Director, Bureau of Communicable Diseases, Massachusetts Department of Public Health; Ronald Altman, M.D., Director, Division af Preventable Diseases, New Jersey State Department of Health; Cecil B. Tucker, M.D., Director and Deputy Commissianer for State Services, Divisian of Preventable Diseases, Tennessee Department af Public Health; and a graup af EIS Officers.)

Editor's Note:

The Salmonellosis Unit of the NCDC is interested in learning the details of any outbreak, hospital or otherwise, due to *S. infantis*.

SUMMARY OF REPORTED CASES OF INFECTIOUS SYPHILIS

CASES OF PRIMARY AND SECONDARY SYPHILIS: By Reportine Areas June 1968 and June 1969 – Provisional Oata

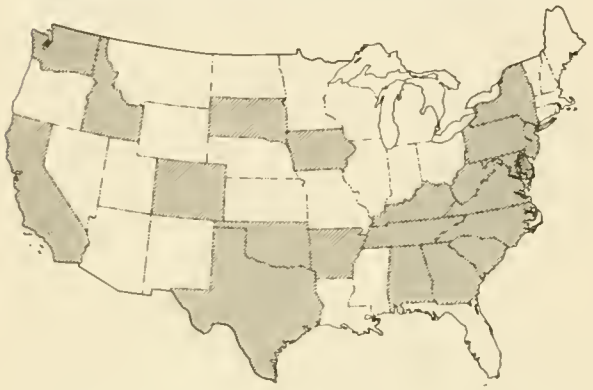
Reporting Area	June		Cumulative Jan – June	
	1969	1968	1969	1968
NEW ENGLAND	33	18	168	165
Maine	1	–	3	2
New Hampshire	2	–	3	–
Vermont	–	–	–	–
Massachusetts	18	10	101	99
Rhode Island	2	2	16	21
Connecticut	10	6	45	43
MIDDLE ATLANTIC	256	279	1,828	1,582
Upstate New York	16	17	141	102
New York City	160	182	1,248	1,001
Pa. (Excl. Phila.)	16	28	76	128
Philadelphia	24	8	111	121
New Jersey	40	44	252	230
EAST NORTH CENTRAL	194	193	1,255	1,456
Ohio	21	26	178	233
Indiana	23	25	173	176
Downstate Illinois	19	13	130	85
Chicago	76	76	450	513
Michigan	50	51	316	437
Wisconsin	5	2	8	12
WEST NORTH CENTRAL	30	24	162	182
Minnesota	2	2	16	18
Iowa	1	3	20	19
Missouri	16	9	83	87
North Dakota	1	4	5	6
South Dakota	–	4	7	23
Nebraska	4	1	15	17
Kansas	6	1	16	12
SOUTH ATLANTIC	387	378	2,440	2,631
Delaware	5	1	21	18
Maryland	41	37	224	222
District of Columbia	54	50	277	324
Virginia	18	26	124	143
West Virginia	1	5	9	19
North Carolina	32	38	270	343
South Carolina	41	32	294	263
Georgia	93	52	489	400
Florida	102	137	732	899
EAST SOUTH CENTRAL	59	126	515	741
Kentucky	6	12	97	58
Tennessee	17	42	157	184
Alabama	25	40	122	310
Mississippi	11	32	139	189
WEST SOUTH CENTRAL	297	222	1,788	1,705
Arkansas	24	10	90	67
Louisiana	53	60	329	419
Oklahoma	5	4	43	43
Texas	215	148	1,326	1,176
MOUNTAIN	56	41	288	264
Montana	3	–	5	4
Idaho	2	–	4	3
Wyoming	–	1	4	1
Colorado	1	–	25	9
New Mexico	25	12	127	75
Arizona	18	20	92	142
Utah	1	5	6	7
Nevada	6	3	25	23
PACIFIC	171	103	950	844
Washington	7	2	27	25
Oregon	2	3	22	19
California	161	98	897	797
Alaska	1	–	1	–
Hawaii	–	–	3	3
U. S. TOTAL	1,483	1,384	9,394	9,570
TERRITORIES	122	117	636	583
Puerto Rico	120	113	628	552
Virgin Islands	2	4	8	31

Note: Cumulative Totals include revised and delayed reports through previous months.

CURRENT TRENDS
ROCKY MOUNTAIN SPOTTED FEVER

During the first 28 weeks of 1969, a total of 200 cases of Rocky Mountain Spotted Fever from 22 states were reported to the NCDC, a twofold increase over the 100 cases reported for that period in 1968 and nearly a twofold increase over the 125 cases in 1967 (Figure 2) (Table 3). A majority of states reporting cases this year (17 of 22) also reported cases last year. Although county data were not available from all states, from five states reporting county distribution, it appears that generally cases are occurring in the same areas as last year (Figure 3).

Figure 2
STATES REPORTING CASES OF ROCKY MOUNTAIN SPOTTED FEVER THROUGH FIRST 28 WEEKS OF 1969



Additional data were obtained by a survey of nine states reporting cases. Of the 145 cases including nine deaths from these states, 84 were in males and 43 in females; sex was not reported in 18 cases (Table 4). Of these cases, 102 were in persons under 20 years of age and 69 were in children under 10 years of age.

Toble 4
Age and Sex Distribution of Rocky Mountain Spotted Fever Coses from Nine Stotes*
for First 28 Weeks of 1969

Age Group (Years)	Sex			Total
	Male	Female	Unknown	
<1-4	11	15		26
5-9	29	14		43
10-19	27	6		33
20-29	3	2		5
30-39	1	1		2
40-49	5	4		9
50-59	3			3
-60	4	1		5
Unknown	1		18	19
Total	84	43	18	145

*Arkansas, Colorado, Idaho, Maryland, North Carolina, Oklahoma, Tennessee, Virginia, and Washington

Although the 200 cases reported through the first 28 weeks of 1969 is greater than the mean (119 cases) for the same period for the years 1952-1955 and 1962-1968*, there has been a wide range in reported cases from a high of 170 in 1952 to a low of 66 cases in 1963.

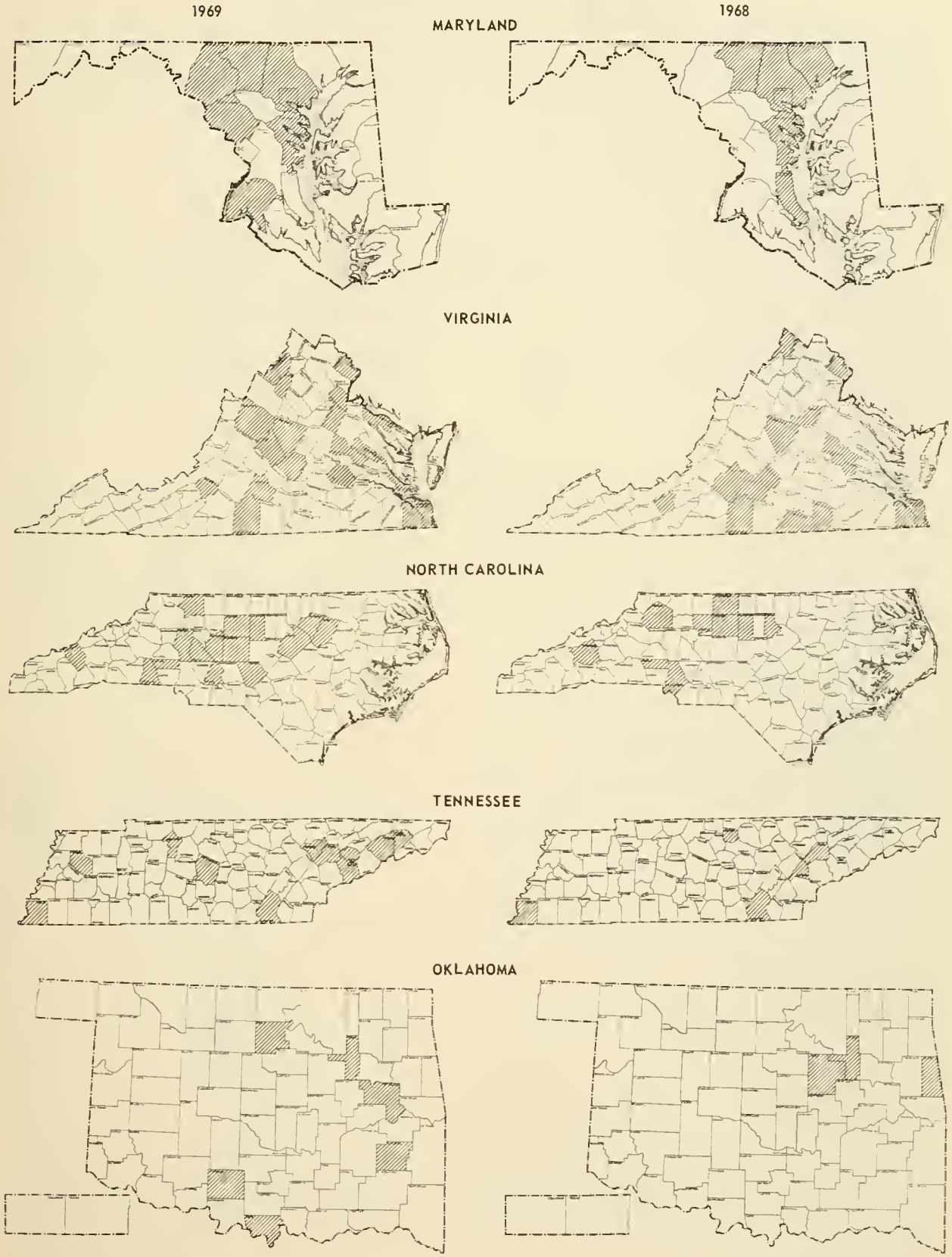
(Reported by the Statistics Section, and Viral Diseases Branch, Epidemiology Program, NCDC.)

*Data not presently available for 1956-1961.

Toble 3
Coses of Rocky Mountoin Spotted Fever by Stote for First 28 Weeks of 1967, 1968, ond 1969

Area	1967	1968	1969
United States	125	100	200
New England	–	–	–
Maine	–	–	–
New Hampshire	–	–	–
Vermont	–	–	–
Massuchusetts	–	–	–
Rhode Island	–	–	–
Connecticut	–	–	–
Middle Atlantic	17	7	24
New York City	–	–	–
New York, Up-State	4	1	5
New Jersey	6	1	6
Pennsylvania	7	5	13
East North Central	13	3	–
Ohio	7	2	–
Indiana	1	–	–
Illinois	5	1	–
Michigan	–	–	–
Wisconsin	–	–	–
West North Central	1	3	2
Minnesota	–	–	–
Iown	–	–	1
Missouri	1	1	–
North Dakota	–	–	–
South Dakota	–	1	1
Nebraska	–	1	–
Kansas	–	–	–
South Atlantic	49	54	108
Delaware	–	–	2
Maryland	10	6	25
District of Columbia	–	–	–
Virginia	14	22	36
West Virginia	–	–	4
North Carolina	17	16	29
South Carolina	3	2	6
Georgia	5	6	6
Florida	–	2	–
East South Central	20	17	32
Kentucky	7	3	5
Tennessee	9	12	26
Alabama	4	1	1
Mississippi	–	1	–
West South Central	11	13	21
Arkansas	3	1	4
Louisiana	–	–	–
Oklahomn	6	6	14
Texas	2	6	3
Mountnin	8	2	8
Montana	–	–	–
Idaho	–	–	1
Wyoming	–	–	–
Colorndo	8	2	7
New Mexico	–	–	–
Arizona	–	–	–
Utnh	–	–	–
Nevnda	–	–	–
Pacific	6	1	5
Washington	1	–	3
Oregon	–	–	–
Cnlifornin	5	1	2
Alaska	–	–	–
Hawnii	–	–	–
Puerto Rico	–	–	–

Figure 3
COUNTY DISTRIBUTION OF ROCKY MOUNTAIN SPOTTED FEVER CASES
IN FIVE STATES FOR FIRST 26 WEEKS – 1969 AND 1968



SURVEILLANCE SUMMARY
ENCEPHALITIS – United States 1967

In the United States during 1967, a total of 2,368 cases of encephalitis including 245 deaths were reported to the NCDC (Table 5) compared with 3,102 cases recorded in 1966. This reduction from 1966 can be accounted for, in part, by the lack of known arboviral outbreaks in 1967. Just over half of the reported cases in 1967 were of unknown etiology. Of the remainder, 83 were of arboviral etiology, while 995 were associated with childhood infections (measles, mumps, chickenpox, and rubella). Despite the lack of a known arhoviral outbreak in 1967, an increased number of cases occurred in the summer months. This increase cannot be entirely attributed to confirmed enteroviral or enteroviral-associated cases, but rather to cases of unknown etiology.

The distribution of cases of Western Encephalitis (WE), Eastern Encephalitis (EE), California (CE), and St. Louis Encephalitis (SLE) is presented in Figure 4. With one exception, all arboviral cases were confirmed by virus isolation or diagnostic fourfold rise or fall in antibody titers hetween acute and convalescent specimens. Seven cases of CE (one from Iowa and six from Ohio) were reported as CE on the basis of clinical and epidemiologic findings supported by serologic evidence other than fourfold changes in titer. All reported cases of CE occurred in the childhood and adolescent age groups, while the reported cases of other types of arbovirus infection affected all age groups.

In 1967 there were 26 confirmed encephalitis cases associated with enteroviral infection (Table 6). As in 1966, males were apparently affected more frequently than females (17 in males compared with nine in females). Coxsackie B-5 and ECHO 9 were the enteroviral types most commonly associated with encephalitis in 1967.

The number of cases, deaths, and death to case ratio for reported cases of encephalitis associated with measles, mumps, chickenpox, and rubella are shown in Table 7.

Toble 5
Etiology of 2,368 Coses of Encepholitis, Including 245 Deaths
Reported to the Neurotropic Viral Diseases Unit, NCDC, 1967

Category and Etiology	Cases		Deaths		Death to Case Ratio (Percent)
	Number	Percent of Total	Number	Percent of Total	
I. Arboviral	83	3.5	2	.8	2.4
Western Encephalitis	18		–		
Eastern Encephalitis	1		1		
California Encephalitis	53		1		
St. Louis Encephalitis	11		–		
Venezuelan Encephalitis	–		–		
II. Enteroviral (Confirmed)	26	1.1	–		
III. Associated with Childhood Infections	995	41.7	40	16.3	4.0
Measles	62		6		
Mumps	849		8		
Chickenpox	77		24		
Rubella	7		2		
IV. Associated with Respiratory Illnesses	2	.1	–		
Adenovirus	1				
Mycoplasma pneumoniae	1				
V. Association with Immunization	4	.2			
Post-vaccinial	4				
VI. Other	40	1.7	12	4.9	30.0
Lymphocytic choriomeningitis	3		–		
Herpes simplex	30		8		
Herpes zoster	7		4		
Infectious mononucleosis	–				
VII. Unknown and Complex Etiology	1218	51.0	191	78.0	15.7
Unknown	1215		191		
Complex	3		–		
Total	2368	100.0	245	100.0	10.3

Table 6
Cases of Confirmed Enterovirol Encepholitis and All Cases Associoted with Enterovirol Isolotions, by Age Group and Etiology

Age Group	Sex		Conf.	Total Isol.	Cox.-B5		Other Cox. A & B		ECHO-9		Other ECHO	
	Male	Female			Conf.	Total Isol.	Conf.	Total Isol.	Conf.	Total Isol.	Conf.	Total Isol.
<1	5	1	3	4	1	2	2	1				1
1-4			3	19	2	7	1	3		8		1
5-9	5	4	9	45		6	4	5	1	29	4	5
10-14	2	0	2	9	1	1	1	1		6		1
15-19	2	1	3	11	1	1		1		6	2	3
20-29	1	2	3	11		5			2	5	1	1
30-39	1	0	1	8		3		1	1	4		
40+	0	1	1	1	1	1						
Unk.	1	0	1	4			1	1		3		
Total			26	112	6	26	9	13	4	61	7	12

Figure 4
HUMAN CASES OF ARTHROPODBORNE ENCEPHALITIS BY STATE, 1967

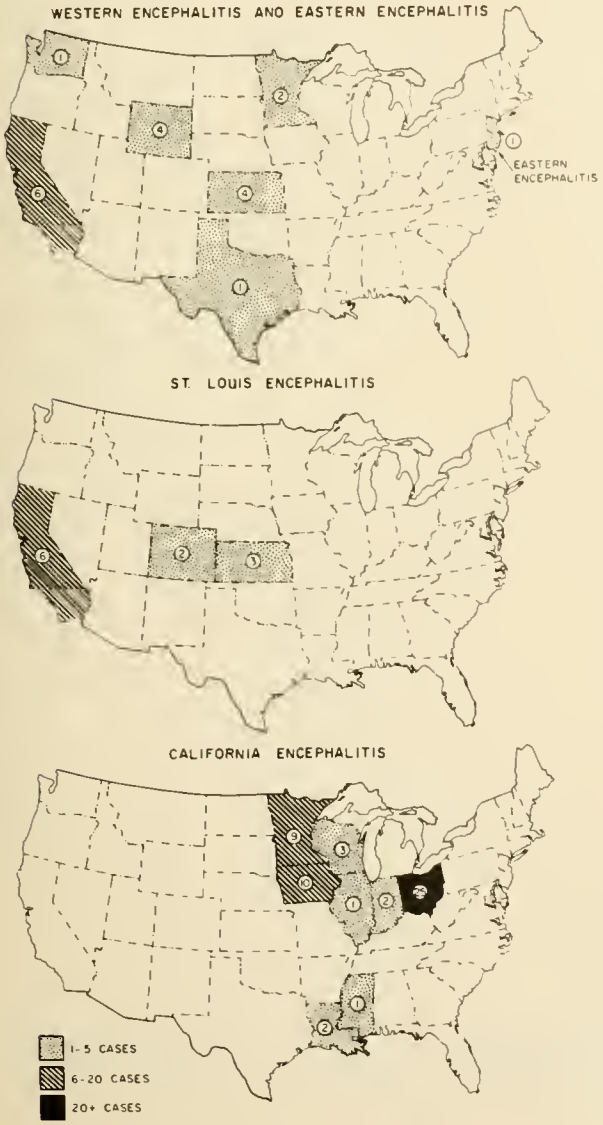


Table 7
Encepholitis Associoted with Childhood Illnesses

Etiology	Number of Cases	Number of Deaths	Death to Case Ratio (Percent)
Measles	62	6	9.7
Mumps	849	8	.9
Chickenpox	77	24	31.2
Rubella	7	2	28.6
Total	995	40	4.0

Notably the number of encephalitis cases and deaths associated with measles decreased from 219 and 29 in 1966 to 62 and 6 in 1967. The number of cases associated with mumps, however, increased from 628 in 1966 to 849 in 1967 while the reported deaths decreased from 10 to 8. It is well recognized that a large proportion of cases of mumps reported as encephalitis actually represent benign aseptic meningitis. The low death to case ratio probably reflects the low incidence of true encephalitis associated with mumps infection. In light of the recently recognized association of Reye's syndrome (acute encephalopathy with fatty degeneration of the viscera) with chickenpox, it may be that this entity accounts for the substantial proportion of the deaths attributed to chickenpox "encephalitis" since Reye's syndrome, as thus far reported, bears a high mortality.

(Reported by the Neurotropic Viral Diseases Unit, Virol Diseases Branch, Epidemiology Progrom, and the Arbovirology Unit, Virology Section, Loborotory Division, NCDC.)

A copy of the report from which these data were derived is available on request from

National Communicable Disease Center
Attn: Chief, Neurotropic Viral Diseases Unit
Viral Diseases Branch, Epidemiology Program
Atlanta, Georgia 30333

TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES

FOR WEEKS ENDED

JULY 19, 1969 AND JULY 20, 1968 (29th WEEK)

AREA	ASEPTIC MENINGITIS	BRUCELLOSIS	DIPHTHERIA	ENCEPHALITIS			HEPATITIS			MALARIA	
				Primary including unsp. cases		Post-Infectious	Serum	Infectious			
	1969	1969	1969	1969	1968	1969	1969	1969	1968	1969	Cum. 1969
UNITED STATES...	72	6	1	23	26	4	102	830	786	74	1,484
NEW ENGLAND.....	–	–	–	1	1	–	–	65	42	2	48
Maine*	–	–	–	–	–	–	–	1	4	–	3
New Hampshire	–	–	–	–	–	–	–	3	–	–	2
Vermont	–	–	–	–	–	–	–	1	–	–	–
Massachusetts	–	–	–	–	1	–	–	30	19	2	35
Rhode Island	–	–	–	–	–	–	–	21	1	–	3
Connecticut	–	–	–	1	–	–	–	9	18	–	5
MIDDLE ATLANTIC.....	4	1	–	–	6	2	55	186	90	4	158
New York City	1	–	–	–	2	–	48	40	39	–	13
New York, Up-State	1	–	–	–	1	–	–	36	24	2	27
New Jersey*	–	–	–	–	1	–	5	49	–	2	56
Pennsylvania	2	1	–	–	2	2	2	61	27	–	62
EAST NORTH CENTRAL...	5	1	–	10	6	–	11	104	95	13	151
Ohio	1	–	–	6	5	–	2	26	38	–	14
Indiana	1	–	–	–	–	–	–	5	5	–	10
Illinois	–	1	–	1	1	–	1	24	22	12	90
Michigan	3	–	–	3	–	–	8	46	22	1	36
Wisconsin	–	–	–	–	–	–	–	3	8	–	1
WEST NORTH CENTRAL...	4	1	–	1	–	–	1	46	43	7	97
Minnesota*	3	–	–	–	–	–	1	5	12	–	7
Iowa*	1	–	–	–	–	–	–	3	6	–	7
Missouri	–	–	–	–	–	–	–	20	18	2	26
North Dakota	–	–	–	1	–	–	–	1	–	–	2
South Dakota	–	–	–	–	–	–	–	1	–	–	–
Nebraska	–	1	–	–	–	–	–	12	–	–	3
Kansas	–	–	–	–	–	–	–	4	7	5	52
SOUTH ATLANTIC.....	12	–	–	2	1	–	3	47	72	6	448
Delaware	–	–	–	–	–	–	–	1	3	–	2
Maryland	8	–	–	–	1	–	2	15	14	1	19
Dist. of Columbia	–	–	–	–	–	–	–	–	1	–	1
Virginia	–	–	–	2	–	–	–	11	8	1	18
West Virginia	–	–	–	–	–	–	–	1	6	–	–
North Carolina	4	–	–	–	–	–	–	8	6	4	205
South Carolina	–	–	–	–	–	–	–	5	1	–	41
Georgia	–	–	–	–	–	–	–	6	14	–	139
Florida	–	–	–	–	–	–	1	–	19	–	23
EAST SOUTH CENTRAL...	2	1	–	1	1	–	–	87	71	11	63
Kentucky	2	–	–	–	–	–	–	56	24	11	53
Tennessee	–	1	–	1	–	–	–	8	26	–	–
Alabama	–	–	–	–	–	–	–	11	4	–	8
Mississippi	–	–	–	–	1	–	–	12	17	–	2
WEST SOUTH CENTRAL...	9	1	1	3	3	1	–	58	50	17	57
Arkansas	–	–	–	–	–	–	–	–	5	–	6
Louisiana	5	–	–	3	3	–	–	12	8	2	30
Oklahoma	–	–	–	–	–	–	–	4	4	15	21
Texas	4	1	1	–	–	1	–	42	33	–	–
MOUNTAIN.....	1	–	–	–	–	–	–	49	41	4	112
Montana	–	–	–	–	–	–	–	2	6	2	2
Idaho	–	–	–	–	–	–	–	1	2	–	3
Wyoming	–	–	–	–	–	–	–	–	2	–	–
Colorado	1	–	–	–	–	–	–	25	15	2	95
New Mexico	–	–	–	–	–	–	–	4	4	–	6
Arizona.*	–	–	–	–	–	–	–	12	8	–	1
Utah	–	–	–	–	–	–	–	5	3	–	1
Nevada	–	–	–	–	–	–	–	–	1	–	4
PACIFIC.....	35	1	–	5	8	1	32	188	282	10	350
Washington	–	–	–	–	1	–	–	4	23	–	5
Oregon	–	–	–	–	1	–	1	13	26	–	7
California	12	1	–	5	6	1	31	171	232	10	268
Alaska	23	–	–	–	–	–	–	–	1	–	2
Hawaii	---	---	---	---	–	---	---	---	–	---	68
Puerto Rico	–	–	–	–	–	–	–	20	16	–	1

*Delayed reports: Aseptic meningitis: Iowa 1, Ariz. 1
Brucellosis: Iowa 2
Encephalitis primary: Minn. 1
Hepatitis, infectious: Me. 3, N.J. 11

TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES

FOR WEEKS ENDED

JULY 19, 1969 AND JULY 20, 1968 (29th WEEK) - CONTINUED

AREA	MEASLES (Rubeola)			MENINGOCOCCAL INFECTIONS, TOTAL			MUMPS	POLIOMYELITIS			RUBELLA
		Cumulative			Cumulative			Total	Paralytic		
	1969	1969	1968	1969	1969	1968	1969	1969	1969	Cum. 1969	1969
UNITED STATES...	328	19,056	18,310	32	2,135	1,767	889	–	–	4	547
NEW ENGLAND.....	31	1,024	1,099	–	70	90	134	–	–	1	39
Maine*	–	5	35	–	6	6	2	–	–	–	–
New Hampshire*	1	237	141	–	2	7	1	–	–	–	–
Vermont.....	1	3	2	–	–	1	–	–	–	–	–
Massachusetts*	7	186	341	–	31	40	44	–	–	–	13
Rhode Island.....	–	22	1	–	6	7	21	–	–	–	5
Connecticut.....	22	571	579	–	25	29	66	–	–	1	21
MIDDLE ATLANTIC.....	113	7,166	3,569	5	340	319	162	–	–	–	43
New York City.....	64	4,736	1,719	–	69	67	144	–	–	–	25
New York, Up-State.	7	573	1,164	5	56	54	NN	–	–	–	12
New Jersey.....	10	845	577	–	142	116	18	–	–	–	1
Pennsylvania*	32	1,012	109	–	73	82	NN	–	–	–	5
EAST NORTH CENTRAL...	38	1,950	3,569	9	297	211	181	–	–	–	162
Ohio.....	4	348	283	7	114	58	16	–	–	–	7
Indiana.....	–	453	618	–	34	26	6	–	–	–	19
Illinois.....	13	418	1,330	1	41	47	18	–	–	–	52
Michigan*	7	214	241	1	90	62	40	–	–	–	51
Wisconsin.....	14	517	1,097	–	18	18	101	–	–	–	33
WEST NORTH CENTRAL...	5	494	367	–	112	89	29	–	–	–	17
Minnesota*	–	5	15	–	25	21	–	–	–	–	–
Iowa.....	–	324	95	–	15	6	12	–	–	–	4
Missouri.....	–	16	81	–	48	31	5	–	–	–	4
North Dakota.....	1	10	124	–	–	3	1	–	–	–	5
South Dakota.....	–	3	4	–	1	4	NN	–	–	–	–
Nebraska.....	4	132	38	–	9	6	11	–	–	–	4
Kansas.....	–	4	10	–	14	18	–	–	–	–	–
SOUTH ATLANTIC.....	23	2,382	1,403	7	380	360	103	–	–	1	100
Delaware.....	4	373	15	1	5	7	8	–	–	–	–
Maryland.....	–	63	85	2	35	26	25	–	–	–	9
Dist. of Columbia..	–	–	6	–	9	14	–	–	–	–	1
Virginia.....	13	867	290	2	48	28	31	–	–	–	32
West Virginia.....	2	166	258	–	18	9	38	–	–	–	56
North Carolina.....	4	303	281	–	66	73	NN	–	–	–	–
South Carolina.....	–	110	12	–	54	56	1	–	–	–	–
Georgia.....	–	1	4	–	64	61	–	–	–	–	–
Florida.....	–	499	452	2	81	86	–	–	–	1	2
EAST SOUTH CENTRAL...	2	102	465	4	136	149	54	–	–	–	33
Kentucky.....	1	60	96	3	49	58	13	–	–	–	25
Tennessee.....	–	17	55	1	51	49	38	–	–	–	8
Alabama.....	–	3	85	–	21	22	3	–	–	–	–
Mississippi.....	1	22	229	–	15	20	–	–	–	–	–
WEST SOUTH CENTRAL...	89	4,230	4,542	–	285	289	87	–	–	2	55
Arkansas.....	–	16	2	–	28	19	–	–	–	–	–
Louisiana.....	–	120	7	–	74	81	–	–	–	–	–
Oklahoma.....	1	136	110	–	29	49	–	–	–	–	–
Texas.....	88	3,958	4,423	–	154	140	87	–	–	2	55
MOUNTAIN.....	19	750	939	–	37	27	56	–	–	–	49
Montana.*	1	16	57	–	5	3	2	–	–	–	1
Idaho.....	–	88	20	–	6	11	–	–	–	–	–
Wyoming.....	–	–	51	–	–	–	–	–	–	–	–
Colorado.....	–	115	481	–	6	8	5	–	–	–	10
New Mexico.....	9	226	88	–	6	–	19	–	–	–	–
Arizona.....	8	297	216	–	10	1	25	–	–	–	27
Utah.....	1	7	21	–	2	1	5	–	–	–	11
Nevada.....	–	1	5	–	2	3	–	–	–	–	–
PACIFIC.....	8	958	2,357	7	478	233	83	–	–	–	49
Washington.....	–	57	514	–	50	37	5	–	–	–	3
Oregon.....	4	195	457	–	11	18	8	–	–	–	15
California.....	4	671	1,349	7	396	165	68	–	–	–	24
Alaska.....	–	8	2	–	11	2	2	–	–	–	7
Hawaii.....	---	27	35	---	10	11	---	---	---	–	---
Puerto Rico.....	60	1,224	354	–	15	19	9	–	–	–	1

*Delayed reports: Measles: N.H. 8, Mass. delete 2, Pa. delete 14, Mich. 10, Mont. 5
Meningococcal infections: Minn. 1
Mumps: N.H. 3
Rubella: Me. 1

TABLE III. CASES OF SPECIFIED NOTIFIABLE DISEASES: UNITED STATES

FOR WEEKS ENDED

JULY 19, 1969 AND JULY 20, 1968 (29th WEEK) - CONTINUED

AREA	STREPTOCOCCAL SORE THROAT & SCARLET FEVER	TETANUS		TULAREMIA		TYPHOID FEVER		TYPHUS FEVER TICK-BORNE (Rky. Mt. Spotted)		RABIES IN ANIMALS	
	1969	1969	Cum. 1969	1969	Cum. 1969	1969	Cum. 1969	1969	Cum. 1969	1969	Cum. 1969
UNITED STATES...	4,073	4	73	1	80	3	149	21	221	69	2,067
NEW ENGLAND.....	629	–	–	–	14	–	5	–	–	1	12
Maine.*	1	–	–	–	–	–	1	–	–	–	5
New Hampshire	–	–	–	–	–	–	–	–	–	–	1
Vermont	–	–	–	–	14	–	–	–	–	1	2
Massachusetts	81	–	–	–	–	–	3	–	–	–	1
Rhode Island	36	–	–	–	–	–	1	–	–	–	–
Connecticut	511	–	–	–	–	–	–	–	–	–	3
MIDDLE ATLANTIC.....	209	–	11	–	3	–	15	2	26	1	82
New York City	12	–	5	–	1	–	6	–	–	–	–
New York, Up-State.	167	–	2	–	2	–	5	–	5	1	77
New Jersey	NN	–	2	–	–	–	–	–	6	–	–
Pennsylvania	30	–	2	–	–	–	4	2	15	–	5
EAST NORTH CENTRAL...	257	2	11	–	7	1	14	–	–	6	137
Ohio	39	1	1	–	–	–	7	–	–	3	38
Indiana	69	–	–	–	1	–	–	–	–	–	40
Illinois	63	1	7	–	2	1	3	–	–	–	25
Michigan	54	–	3	–	–	–	4	–	–	–	4
Wisconsin	32	–	–	–	4	–	–	–	–	3	30
WEST NORTH CENTRAL...	150	–	5	–	8	–	4	–	2	14	386
Minnesota.*	3	–	1	–	–	–	1	–	–	5	96
Iowa	36	–	–	–	–	–	–	–	1	3	57
Missouri	1	–	1	–	5	–	2	–	–	1	106
North Dakota	35	–	–	–	–	–	–	–	–	1	51
South Dakota	8	–	–	–	–	–	–	–	1	–	13
Nebraska	67	–	–	–	–	–	1	–	–	–	10
Kansas	–	–	3	–	3	–	–	–	–	4	53
SOUTH ATLANTIC.....	380	–	14	1	20	1	27	13	121	15	550
Delaware	8	–	–	–	–	–	1	–	2	–	–
Maryland	75	–	–	–	–	–	4	5	30	–	–
Dist. of Columbia	–	–	2	–	–	–	1	–	–	–	–
Virginia	172	–	–	1	4	–	–	2	38	9	287
West Virginia	89	–	1	–	2	–	1	1	5	1	85
North Carolina	NN	–	2	–	5	1	5	3	32	–	4
South Carolina	11	–	1	–	2	–	1	1	7	–	–
Georgia	5	–	–	–	3	–	7	1	7	1	49
Florida	20	–	8	–	4	–	7	–	–	4	125
EAST SOUTH CENTRAL...	1,065	–	10	–	9	–	16	1	33	7	318
Kentucky	132	–	3	–	–	–	2	–	5	3	166
Tennessee	737	–	4	–	8	–	12	1	27	1	112
Alabama	87	–	2	–	–	–	–	–	1	3	37
Mississippi	109	–	1	–	1	–	2	–	–	–	3
WEST SOUTH CENTRAL...	468	1	14	–	11	–	20	5	26	9	280
Arkansas	–	–	–	–	1	–	10	–	4	–	21
Louisiana	–	1	6	–	2	–	1	–	–	2	19
Oklahoma	8	–	1	–	5	–	–	4	18	1	42
Texas	460	–	7	–	3	–	9	1	4	6	198
MOUNTAIN.....	814	1	2	–	8	–	20	–	8	1	93
Montana	20	–	–	–	–	–	–	–	–	–	–
Idaho	19	–	–	–	–	–	3	–	1	–	–
Wyoming.*	3	–	–	–	2	–	5	–	–	–	48
Colorado	422	–	1	–	–	–	2	–	7	–	3
New Mexico	185	–	–	–	1	–	5	–	–	–	9
Arizona	–	1	1	–	–	–	4	–	–	–	22
Utah	165	–	–	–	5	–	–	–	–	1	3
Nevada	–	–	–	–	–	–	1	–	–	–	8
PACIFIC.....	101	–	6	–	–	1	28	–	5	15	209
Washington	5	–	1	–	–	–	1	–	3	–	1
Oregon	62	–	–	–	–	–	6	–	–	1	2
California	---	–	5	–	–	1	21	–	2	14	206
Alaska	34	–	–	–	–	–	–	–	–	–	–
Hawaii.*	---	---	–	---	–	---	–	---	–	---	–
Puerto Rico	4	–	4	–	–	–	3	–	–	–	18

*Delayed reports: SST: Me. 1, Wyo. 3, Hawaii 133
Tetanus: Minn. 1

Week No. 29

TABLE IV. DEATHS IN 122 UNITED STATES CITIES FOR WEEK ENDED JULY 19, 1969

(By place of occurrence and week of filing certificate. Excludes fetal deaths)

Area	All Causes		Pneumonia and Influenza All Ages	Under 1 year All Causes
	All Ages	65 years and over		
NEW ENGLAND:	687	425	40	45
Boston, Mass.	212	110	12	20
Bridgeport, Conn.	40	31	1	2
Cambridge, Mass.	26	19	7	1
Fall River, Mass.	31	22	1	1
Hartford, Conn.	60	39	1	2
Lowell, Mass.	21	11	1	1
Lynn, Mass.	21	14	–	4
New Bedford, Mass.	26	14	1	–
New Haven, Conn.	58	34	–	1
Providence, R. I.	56	35	7	3
Somerville, Mass.	16	13	1	–
Springfield, Mass.	42	29	7	1
Waterbury, Conn.	33	24	–	6
Worcester, Mass.	45	30	1	3
MIDDLE ATLANTIC:	3,167	1,885	130	130
Albany, N. Y.	36	20	4	1
Allentown, Pa.	35	23	4	1
Buffalo, N. Y.	151	92	2	5
Camden, N. J.	38	25	2	1
Elizabeth, N. J.	72	43	1	3
Erie, Pa.	38	20	3	2
Jersey City, N. J.	72	52	6	3
Newark, N. J.	59	30	1	3
New York City, N. Y.	1,687	1,003	54	75
Paterson, N. J.	–	–	–	–
Philadelphia, Pa.	399	222	6	15
Pittsburgh, Pa.	189	105	9	8
Reading, Pa.	48	29	–	–
Rochester, N. Y.	105	71	20	4
Schenectady, N. Y.	28	14	1	2
Scranton, Pa.	31	23	4	1
Syracuse, N. Y.	81	51	2	1
Trenton, N. J.	51	27	5	3
Utica, N. Y.	19	13	2	1
Yonkers, N. Y.	28	22	4	1
EAST NORTH CENTRAL:	2,582	1,455	82	129
Akron, Ohio	54	26	–	5
Canton, Ohio	24	11	1	2
Chicago, Ill.	728	355	32	44
Cincinnati, Ohio	189	112	2	9
Cleveland, Ohio	186	94	1	6
Columbus, Ohio	112	64	–	7
Dayton, Ohio	79	45	6	2
Detroit, Mich.	361	210	5	17
Evansville, Ind.	42	29	2	1
Flint, Mich.	46	21	–	5
Fort Wayne, Ind.	56	35	4	3
Gary, Ind.	39	17	2	3
Grand Rapids, Mich.	48	35	4	2
Indianapolis, Ind.	137	79	3	3
Madison, Wis.	37	17	5	5
Milwaukee, Wis.	140	100	2	3
Peoria, Ill.	38	24	1	3
Rockford, Ill.	39	24	8	5
South Bend, Ind.	54	40	2	1
Toledo, Ohio	116	77	–	2
Youngstown, Ohio	57	40	2	1
WEST NORTH CENTRAL:	868	536	31	38
Des Moines, Iowa	62	43	1	2
Duluth, Minn.	42	27	3	3
Kansas City, Kans.	56	32	5	4
Kansas City, Mo.	160	94	4	9
Lincoln, Nebr.	41	28	–	1
Minneapolis, Minn.	104	65	–	4
Omaha, Nebr.	62	33	–	5
St. Louis, Mo.	209	131	7	5
St. Paul, Minn.	68	45	2	4
Wichita, Kans.	64	38	9	1
SOUTH ATLANTIC:	1,124	586	47	58
Atlanta, Ga.	135	72	4	8
Baltimore, Md.	234	121	4	8
Charlotte, N. C.	37	16	1	4
Jacksonville, Fla.	88	37	2	9
Miami, Fla.	100	54	–	2
Norfolk, Va.	66	38	7	8
Richmond, Va.	76	35	3	10
Savannah, Ga.	46	32	7	–
St. Petersburg, Fla.	75	58	9	2
Tampa, Fla.	56	29	5	1
Washington, D. C.	178	71	3	5
Wilmington, Del.	33	23	2	1
EAST SOUTH CENTRAL:	753	396	44	30
Birmingham, Ala.	125	62	2	6
Chattanooga, Tenn.	51	27	5	2
Knoxville, Tenn.	38	28	2	–
Louisville, Ky.	125	69	22	4
Memphis, Tenn.	177	85	5	10
Mobile, Ala.	65	30	1	5
Montgomery, Ala.	60	33	3	1
Nashville, Tenn.	112	62	4	2
WEST SOUTH CENTRAL:	1,269	678	62	81
Austin, Tex.	51	23	8	6
Baton Rouge, La.	57	38	1	–
Corpus Christi, Tex.	34	19	4	3
Dallas, Tex.	162	88	3	10
El Paso, Tex.	31	18	1	2
Fort Worth, Tex.	101	52	4	3
Houston, Tex.	247	111	9	13
Little Rock, Ark.	70	34	4	3
New Orleans, La.	166	89	8	12
Oklahoma City, Okla.	94	48	3	10
San Antonio, Tex.	117	71	7	12
Shreveport, La.	78	45	5	7
Tulsa, Okla.	61	42	5	–
MOUNTAIN:	486	264	27	33
Albuquerque, N. Mex.	42	19	2	2
Colorado Springs, Colo.	31	17	7	–
Denver, Colo.	122	71	8	12
Ogden, Utah	23	11	3	6
Phoenix, Ariz.	125	64	1	7
Pueblo, Colo.	27	18	2	–
Salt Lake City, Utah	56	29	2	4
Tucson, Ariz.	60	35	2	2
PACIFIC:	1,527	908	35	66
Berkeley, Calif.	24	16	2	–
Fresno, Calif.	48	30	2	2
Glendale, Calif.	28	18	1	1
Honolulu, Hawaii	41	15	2	8
Long Beach, Calif.	98	59	2	6
Los Angeles, Calif.	436	249	12	18
Oakland, Calif.	82	43	1	4
Pasadena, Calif.	37	25	–	1
Portland, Oreg.	145	98	2	7
Sacramento, Calif.	60	27	1	3
San Diego, Calif.	102	57	2	4
San Francisco, Calif.	169	103	5	1
San Jose, Calif.	39	29	–	–
Seattle, Wash.	130	83	1	6
Spokane, Wash.	43	28	1	3
Tacoma, Wash.	45	28	1	2
Total	12,463	7,133	498	610

Cumulative Totals
including reported corrections for previous weeks

All Causes, All Ages	387,162
All Causes, Age 65 and over	222,961
Pneumonia and Influenza, All Ages	19,481
All Causes, Under 1 Year of Age	17,731

EPIDEMIOLOGIC NOTES AND REPORTS
TYPHOID FEVER FOLLOW-UP – Oregon

Following the outbreak of typhoid fever in a missionary family in Oregon en route to North Dakota from the Philippines (MMWR, Vol. 18, No. 23), three isolates of *Salmonella typhi* were received at the NCDC from recent typhoid fever cases in Pasay City, Philippines. The isolates were phage type B_1, the same as the phage type responsible for the illnesses in the missionary family. This is a rare phage type in the United States accounting for only 1 to 2 percent of strains typed at the NCDC. These laboratory data support epidemiologic information pointing to Pasay City as the likely place where this family was exposed.

(Reported by Jacinto J. Dizon, M.D., Chief, Disease Intelligence Center, Department of Health, Manila; and the Enteric Bacteriology Unit, Bacteriology Section, Microbiology Branch, Laboratory Division, NCDC.)

ERRATA

Vol. 18, No. 28, P. 242

In the article "Primary Amebic Meningoencephalitis – Virginia" in the section *"Reported by . . ."* include *"John Thornton, M.D., Chief of Pathology, Johnson Willis Hospital, Richmond.)"*

Vol. 18, No. 23, p. 204.

In the article "Quarantine Measures" under the Overseas Medical Center, Detroit, Michigan, under clinic hours and fee, delete: Saturday, 9:00-5:00 by appointment and No. Insert: 9:00-5:00 Monday, Tuesday, Thursday, and Friday; Saturday 9:00-1:00 by appointment only and Yes.

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IN ADDITION TO THE ESTABLISHED PROCEDURES FOR REPORTING MORBIDITY AND MORTALITY, THE NATIONAL COMMUNICABLE DISEASE CENTER WELCOMES ACCOUNTS OF INTERESTING OUTBREAKS OR CASE INVESTIGATIONS WHICH ARE OF CURRENT INTEREST TO HEALTH OFFICIALS AND WHICH ARE DIRECTLY RELATED TO THE CONTROL OF COMMUNICABLE DISEASES. SUCH COMMUNICATIONS SHOULD BE ADDRESSED TO:

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ATLANTA, GEORGIA 30333

NOTE: THE DATA IN THIS REPORT ARE PROVISIONAL AND ARE BASED ON WEEKLY TELEGRAMS TO THE NCDC BY THE INDIVIDUAL STATE HEALTH DEPARTMENTS. THE REPORTING WEEK CONCLUDES AT CLOSE OF BUSINESS ON FRIDAY; COMPILED DATA ON A NATIONAL BASIS ARE OFFICIALLY RELEASED TO THE PUBLIC ON THE SUCCEEDING FRIDAY.

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